

PACKAGE WITH ENVIRONMENTAL CONTROL MATERIAL CARRIER

ABSTRACT OF THE DISCLOSURE

A drop-in environmental control material carrier assembly 55, which improves the performance and lowers the cost of semiconductor packages. The disclosed approach positions the environmental control materials inside the package cavity by means of a drop-in environmental control material carrier assembly 54, which can hold up to eight materials. In the case of a packaged micromirror, the getters consist of at least three types; i.e., (1) one for absorbing moisture inside the package, (2) one for absorbing adhesive outgassing constituents inside the package, and (3) one for storing the PFDA lubricant used to prevent the micromirror mirrors from sticking. The performance and lifetime of the micromirror devices are improved and the cost of projection display systems, in which these micromirrors are central components, is lowered. The preceding abstract is submitted with the understanding that it only will be used to assist in determining, from a cursory inspection, the nature and gist of the technical disclosure as described in 37 C.F.R. § 1.72(b). In no case should this abstract be used for interpreting the scope of any patent claims.